

Substrate Attributes - Mobile Phone Project

SUBSTRATE MATERIAL	ADVANTAGES	DISADVANTAGES
Green Board (Circuit Board)	inexpensive readily available precoated with copper good dielectric	poor surface quality poor photolithograhpy thick-takes up too much space
Silicon	large supply excellent surface moderate cost tooling readily available large diameters available	requires dielectric formation
Glass	good dielectric	poor surface quality limited sizes difficult to work with
Quartz	excellent surface good dielectric	expensive (2x silicon cost) limited supply
Sapphire	excellent surface good dielectric	expensive (5x silicon cost) limited supply limited sizes
Kapton	good dielectric flexible inexpensive	poor surface quality difficult to process conductors may not stick well